

**Roanoke Rapids and Gaston Hydropower Project
American Eel Working Group Conference Call
13 May 2019**

Meeting Minutes

Present:

Dominion – Peter Sturke, Bob Graham, Taylor Allen, Karen Canody
NMFS – Fritz Rohde, Twyla Cheatwood
USFWS – John Ellis
NCWRC – Kirk Rundle
NCDMF – Todd Mathes
VDGIF – Dan Michaelson, Scott Smith
Additional - Wilson Laney (Phone)

13 May 2019 American Eel Working Group Meeting – Agenda Draft

- Eel Distribution Reports Review
 1. Upstream of Roanoke Rapids
 2. Downstream of Gaston
- Gaston Traps
 1. South Gaston operational and tagging numbers thus far
 2. North Gaston Trap future
- Lake Gaston Tributary Scouting and plan after passage is established
- Update on Johnson Pond Sampling
- Update on Downstream RRapids Study Design
- Reviews needed in near future:
 1. Eel Distribution reports due to FERC by end of May 2019
 2. Upstream Gaston Eel Passage Engineering design review
 - 60% Design Review should begin 5 June 2019

Eel Distribution Reports

The first report discussed was the Eel Distribution Upstream of Roanoke Rapids Dam 2015-2018. The main points from the report that will be submitted to FERC was that 212,993 eels were transported upstream from 2015-2018. Electrofishing results discovered one Silver Stage American Eel in the fall sampling effort on Deep Creek in 2016. Additionally, the study on the Roanoke Rapids Lake with the Pacific Northwest National Laboratory was discussed and the high level results from that study were included in the report. Ultimately, this report concludes the FERC license requirements to study the Eel Distribution upstream of Roanoke Rapids Dam.

The second report discussed was the Eel Distribution Downstream of Gaston Dam. The main discussion points were that 4,421 eels were captured at the North and South Gaston Traps from 2010-2018. There was an exponential increase from 2016-2018 and the verification electrofishing efforts from 2012-2018 observed catch rates similar to trap catches. Ultimately, this report concludes the FERC license requirements to study the Eel Distribution downstream of Gaston Dam.

Comments or concurrence on these specific reports were solicited and received separate from these calls and will be submitted to the FERC by 31 May 2019.

Gaston Traps

Pete updated the AEWG with the current status of the North and South Gaston Traps. The South Gaston Trap has been operational since 16 April 2019 and has captured 823 Eels thus far. All of those individuals were tagged and released to Lake Gaston as part of Dominion's interim passage efforts. Pete informed the group that on 27 March 2019, the North Eel Trap at Gaston was found to be missing from the collection platform after flood flows were passed through the spillway gates. Initial site reconnaissance was completed by Dominion and they were unable to locate the trap below the dam. Pete expressed Dominion's opinion that this particular trap has served its purpose for monitoring however they value the opinion of the AEWG. He also mentioned that it would take a substantial amount of effort to retrieve, rebuild, or replace the current trap and would likely provide very little value for the remainder of its life considering the new North Eel Trap will be constructed in 2020. **AEWG members (Rundle, Michaelson, Ellis, Mathes, Rohde, and Laney) agreed that the loss of the North Gaston Eel Trap is acceptable.** Wilson noted that if it is found to be easily repaired, please do so. Pete noted that if that is the case, we will keep the AEWG updated.

Lake Gaston Tributary Scouting and plan after passage is established

Pete presented the AEWG with Dominion's efforts to scout the tributary streams upstream of the Gaston Dam. Multiple streams were investigated for their inclusion in the Eel Distribution Studies above Gaston Dam which will likely begin in 2020. The streams investigated were Hawtree, Six Pound, Hubquarter, Big Stonehouse, Little Stonehouse, Pretty, Mill, Poe, Hamlin, Pea Hill, and Lee/Summit Creeks. Considerations were made for their available habitat, access for electrofishing/recapture of tagged individuals, and for the potential to electrofish in the lake portions of those tributaries. Pete broke down the more in depth scouting effort and proposed using Lee Creek for the upstream distribution studies. Dominion gained landowner access to the creek and discovered that there were no eels present currently in the tributary however the habitat was suitable and held crayfish, macroinvertebrates, and other species of fish (Creek Chubs, Mountain Redbelly Dace, Bluegill, and Redbreast Sunfish). Pete also brought up the fact that this site is the closest to Gaston Dam which will decrease the transportation time for the eels. Fritz and Wilson brought up the concept of "letting the eels decide where to go" and related that to releasing the eels in proximity to the collection point being important but expressed reservations about filling the available habitat too quickly. Fritz noted that the numbers caught below Gaston Dam are currently a fraction of what is caught at Roanoke Rapids so it is unlikely Lee Creek could be overstocked quickly. Pete rounded out this discussion by noting that the study plan will focus on Lee Creek going forward and will present the plan once it is developed.

Johnson Pond Sampling

Dominion was able to access Johnson Pond, an impoundment at the headwaters of Deep Creek, the main tributary of Roanoke Rapids Lake. Pete noted that access to the private impoundment was granted through the landowner. The catch per unit effort was very high in the pond and Dominion initially captured 13 individuals with an average of 293 mm Total Length. It was noted that the catch per unit effort was 44.2 fish per hour which was higher than observed in the Deep Creek and below Gaston Dam electrofishing efforts. Pete brought up the nexus for sampling this pond is to determine the ultimate fate of eels released into Deep Creek but more importantly attempt to find Silver Stage American Eels to use for a Downstream Passage Study from 2019-2022. The spillover from the impoundment looked like a suitable spot for a weir, fyke net, or PIT tag detection array should this site be included in future studies.

Downstream Roanoke Rapids Study 2019-2022

Following up on the Johnson Pond Sampling, Dominion updated the AEWG on the progress for the Downstream American Eel Roanoke Rapids study from 2019-2022. AKRF is on board with Dominion Energy and will be developing a conceptual study design for submittal to the FERC by the end of June 2019. It is Dominion's intentions to consult with the AEWG on the final study plan which will be submitted prior to the initiation of the study in 2019. Pete mentioned that the study periods run from October – January of each year with a report to FERC by June of that year. The final report will be submitted to FERC by June 2022 and the AEWG will discuss and decide on the path forward for implementation and design of downstream passage in 2023 as per the Article 401 schedule.

Reviews needed in near future

Pete wrapped up the call with a discussion to remind the AEWG that the reviews on the Distribution reports were due back to Dominion by 17 May 2019. Additionally, the 60% Design of Upstream Passage Facilities will need review starting in mid-June 2019 with the reviews by the USFWS and NMFS fishway engineers due 2 July 2019.